

U.S. PATENT AND TRADEMARK OFFICE; U.S. DEPARTMENT OF COMMERCE

EXPRESS MAIL LABEL NO.: EV 725 078 708 US

December 16, 2005

TRANSMITTAL LETTER TO THE UNITED STATES DESIGNATED/ELECTED OFFICE (DO/EO/US)  
CONCERNING A SUBMISSION UNDER 35 U.S.C. 371

ATTORNEY'S DOCKET NUMBER: 5000.P0090US

U.S. APPLICATION NO. (If known, see 37 CFR 1.5): Unknown

CONFIRMATION NO.: Unknown

INTERNATIONAL APPLICATION NO.: PCT/EP2004/006938

INTERNATIONAL FILING DATE: June 25, 2004

PRIORITY DATE CLAIMED: June 25, 2003

TITLE OF INVENTION: MIXED METAL OXIDES AND USE THEREOF IN CO<sub>2</sub> SENSORS

APPLICANT(S) FOR DO/EO/US: Stefan FABER, Sanjay MATHUR, Ralph NONNINGER, Frank MEYER, Michael VEITH, and Hao SHEN

---

Applicant herewith submits to the United States Designated/Elected Office (DO/EO/US) the following items and other information:

1. ☒ This is a **FIRST** submission of items concerning a submission under 35 U.S.C. 371.
2. ☐ This is a **SECOND** or **SUBSEQUENT** submission of items concerning a submission under 35 U.S.C. 371.
3. ☐ This is an express request to begin national examination procedures (35 U.S.C. 371(f)). The submission must include items (5), (6), (9) and (21) indicated below.
4. ☒ The US has been elected (Article 31).
5. ☒ A copy of the International Application as filed (35 U.S.C. 371(c)(2))
  - a. ☒ is attached hereto (required only if not communicated by the International Bureau).
  - b. ☐ has been communicated by the International Bureau.
  - c. ☐ is not required, as the application was filed in the United States Receiving Office (RO/US).
6. ☒ An English language translation of the International Application as filed (35 U.S.C. 371(c)(2))
  - a. ☒ is attached hereto.
  - b. ☐ has been previously submitted under 35 U.S.C. 154(d)(4).
7. ☐ Amendments to the claims of the International Application under PCT Article 19 (35 U.S.C. 371(c)(3))
  - a. ☐ are attached hereto (required only if not communicated by the International Bureau).
  - b. ☐ have been communicated by the International Bureau.
  - c. ☐ have not been made; however, the time limit for making such amendments has NOT expired.
  - d. ☐ have not been made and will not be made.
8. ☐ An English language translation of the amendments to the claims under PCT Article 19 (35 U.S.C. 371(c)(3)).
9. ☐ An oath or declaration of the inventor(s) (35 U.S.C. 371 (c)(4)).
10. ☐ An English language translation of the annexes of the International Preliminary Examination Report under PCT Article 36 (35 U.S.C. 371 (c)(5)).

U.S. APPLICATION NO. (if known, see 37 CFR 1.5): Unknown  
 INTERNATIONAL APPLICATION NO.: PCT/EP2004/006938  
 ATTORNEY'S DOCKET NUMBER: 5000.P0090US

AP9 Rec'd PCT/PTO 19 DEC 2009

**Items 11 to 20 below concern document(s) or information included:**

11. ☒ An Information Disclosure Statement under 37 CFR 1.97 and 1.98.
12. ☐ An assignment document for recording. A separate cover sheet in compliance with 37 CFR 3.28 and 3.31 is included.
13. ☒ A preliminary amendment.
14. ☐ An Application Data Sheet under 37 CFR 1.76.
15. ☐ A substitute specification.
16. ☐ A power of attorney and/or change of address letter.
17. ☐ A computer-readable form of the sequence listing in accordance with PCT Rule 13~~ter~~.2 and 37 CFR 1.821-1.825.
18. ☐ A second copy of the published international application under 35 U.S.C. 154(d)(4).
19. ☐ A second copy of the English language translation of the international application under 35 U.S.C. 154(d)(4).
20. ☒ Other items or information:
  - A. Verification of Translation
  - B. Formal Drawings (4 sheets)
  - C. Cover page of WO 2004/113229 A1
  - D. International Search Report (Form PCT/ISA/210)
  - E. Amendment Before First Office Action
  - F. Post Card

The following fees have been submitted:	Calculations	PTO USE ONLY
21. <input checked="" type="checkbox"/> Basic National Fee (37 CFR 1.492(a)) .....\$300.00	\$300.00	
22. <input checked="" type="checkbox"/> Examination Fee (37 CFR 1.492(c)) If the written opinion prepared by ISA/US or the international preliminary examination report prepared by IPEA/US indicates all claims satisfy provisions of PCT Article 33(1)-(4) .....\$0.00 All other situations .....\$200.00	\$200.00	
23. <input checked="" type="checkbox"/> Search Fee (37 CFR 1.492(b)) If the written opinion of the ISA/US or the international preliminary examination report prepared by IPEA/US indicates all claims satisfy provisions of PCT Article 33(1)-(4) .....\$0.00 Search fee (37 CFR 1.445(a)(2) has been paid on the international application to the USPTO as an International Searching Authority .....\$100.00 International Search Report prepared by an ISA other than the US and provided to the Office or previously communicated to the US by the IB .....\$400.00 All other situations .....\$500.00	\$400.00	
<b>TOTAL OF 21, 22 AND 23 =</b>	<b>\$900.00</b>	

U.S. APPLICATION NO. (if known, see 37 CFR 1.5): Unknown  
 INTERNATIONAL APPLICATION NO.: PCT/EP2004/006938  
 ATTORNEY'S DOCKET NUMBER: 5000.P0090US

AP9 Rec'd PCT/PTO 19 DEC 2009

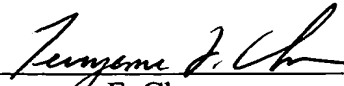
[ ] Additional fee for specification and drawings filed in paper over 100 sheets (excluding sequence listing in compliance with 37 CFR 1.821(c) or (e) or computer program listing in an electronic medium) (37 CFR 1.492(j)). The fee is \$250 for each additional 50 sheets of paper or fraction thereof.					
Total sheets	Extra sheets	Number of each additional 50 or fraction thereof (round up to a whole number)	RATE		
- 100 =	/50 =		x \$250	\$	
Surcharge of <b>\$130.00</b> for furnishing any of the search fee, examination fee, or the oath or declaration after the date of commencement of the national stage (37 CFR 1.492(h)).				\$	
CLAIMS	NUMBER FILED	NUMBER EXTRA	RATE		
Total claims	25 - 20 =	5	x \$ 50.00	\$250.00	
Ind. claims	1 - 3 =	0	x \$200.00	\$	
MULTIPLE DEPENDENT CLAIM(S) (if applicable) + \$360.00				\$	
<b>TOTAL OF ABOVE CALCULATIONS =</b>				<b>\$1,150.00</b>	
[X] Applicant claims small entity status. See 37 CFR 1.27. Fees above are reduced by 1/2. <b>SUBTOTAL =</b>				<b>\$575.00</b>	
Processing fee of <b>\$130.00</b> for furnishing the English translation later than 30 months from the earliest claimed priority date (37 CFR 1.492(i)).				+	\$
<b>TOTAL NATIONAL FEE =</b>				<b>\$575.00</b>	
Fee for recording the enclosed assignment (37 CFR 1.21(h)). The assignment must be accompanied by an appropriate cover sheet (37 CFR 3.28, 3.31). <b>\$40.00</b> per property				+	\$
<b>TOTAL FEES ENCLOSED =</b>				<b>\$575.00</b>	
				Amount to be refunded:	\$
				Amount to be charged:	\$

- a. [X] A check in the amount of \$575.00 to cover the above fees is enclosed.  
 b. [ ] Please charge my Deposit Account No. \_\_\_\_\_ in the amount of \$ \_\_\_\_\_ to cover the above fees. A duplicate copy of this sheet is enclosed.  
 c. [X] The Commissioner is hereby authorized to charge any additional fees which may be required, or credit any overpayment to Deposit Account No. 06-1382. A duplicate copy of this sheet is enclosed.  
 NOTE: Where an appropriate time limit under 37 CFR 1.495 has not been met, a petition to revive (37 CFR 1.137(a) or (b)) must be filed and granted to restore the International Application to pending status.

IN DUPLICATE

PLEASE DIRECT CORRESPONDENCE TO  
 THE ADDRESS ASSOCIATED WITH THE  
 FOLLOWING CUSTOMER NUMBER: 23474

300.07/05

  
 Terryence F. Chapman  
 Registration Number: 32 549  
 TFC/alh

FLYNN, THIEL, BOUTELL & TANIS, P.C.  
 2026 Rambling Road  
 Kalamazoo, Michigan 49008-1631

10/561624

Express Mail Label No.: EV 725 078 708 US

Date of Mailing: DEC 19 2005

Applicant(s): Stefan FABER et al.

Title: MIXED METAL OXIDES AND USE THEREOF IN CO<sub>2</sub> SENSORS

PCT International Application No.: PCT/EP2004/006938

PCT International Filing Date: June 25, 2004

U.S. Application No.

(if known, see 37 CFR 1.5): Unknown

Atty. Docket No.: 5000.P0090US

Mail Stop PCT  
Commissioner for Patents  
P.O. Box 1450  
Alexandria, VA 22313-1450

## EXPRESS MAILING CERTIFICATE

Sir:

I hereby certify that the attached paper or fee is being deposited with the United States Postal Service "Express Mail Post Office to Addressee" service under 37 CFR 1.10 on the date indicated above and is addressed to: Commissioner for Patents, P.O. Box 1450, Alexandria, VA 22313-1450.

FLYNN, THIEL, BOUTELL &amp; TANIS, P.C.

By: Date: DEC 19 2005

Document(s) attached: Form PTO-1390 with enclosures listed  
thereon

Telephone: (269) 381-1156

391.05/05

IN THE UNITED STATES PATENT AND TRADEMARK OFFICE

Application No. :

U.S. National Serial No. :

Filed :

PCT International Application No. : PCT/EP2004/006938

VERIFICATION OF A TRANSLATION

I, Charles Edward SITCH BA,

Deputy Managing Director of RWS Group Ltd UK Translation Division, of Europa House,  
Marsham Way, Gerrards Cross, Buckinghamshire, England declare:

That the translator responsible for the attached translation is knowledgeable in the German language in which the below identified international application was filed, and that, to the best of RWS Group Ltd knowledge and belief, the English translation of the international application No. PCT/EP2004/006938 is a true and complete translation of the above identified international application as filed.

I hereby declare that all the statements made herein of my own knowledge are true and that all statements made on information and belief are believed to be true; and further that these statements were made with the knowledge that willful false statements and the like so made are punishable by fine or imprisonment, or both, under Section 1001 of Title 18 of the United States Code and that such willful false statements may jeopardize the validity of the patent application issued thereon.

Date: November 15, 2005

Signature :



For and on behalf of RWS Group Ltd

Post Office Address :

Europa House, Marsham Way,  
Gerrards Cross, Buckinghamshire,  
England.